

UNITED STATES ENVIRONMENTAL PROTECTION AGENCY  
REGION 6

IN THE MATTER OF	) ADMINISTRATIVE ORDER ON
	) CONSENT FOR REMEDIAL
Devil's Swamp Lake Superfund Site	) INVESTIGATION/FEASIBILITY STUDY
East Baton Rouge Parish, Louisiana	)
	)
Clean Harbors Environmental Services, Inc	) U S EPA Region 6
Safety-Kleen Systems, Inc	) CERCLA Docket No 06-_____
	)
RESPONDENTS	) Proceeding Under Sections 104, 106, 107
	) and 122 of the Comprehensive
	) Environmental Response, Compensation,
	) and Liability Act as amended
	) (42 U S C §§ 9604, 9606, 9607
	) 9622)

ADMINISTRATIVE ORDER ON CONSENT  
FOR REMEDIAL INVESTIGATION/FEASIBILITY STUDY

**I. JURISDICTION AND GENERAL PROVISIONS**

1 This Administrative Order on Consent ("Order") is entered into voluntarily by the United States Environmental Protection Agency ("EPA"), Clean Harbors Environmental Services, Inc, and Safety-Kleen Systems, Inc ("Respondents") The Order concerns the preparation and performance of a remedial investigation and feasibility study ("RI/FS") at the Devil's Swamp Lake Superfund Site ("Site"), located in East Baton Rouge Parish, Louisiana, and the reimbursement for future response costs incurred by EPA in connection with the RI/FS

2 This Order is issued under the authority vested in the President of the United States by Sections 104, 106, 107 and 122 of the Comprehensive Environmental Response, Compensation, and Liability Act, as amended, 42 U S C §§ 9604, 9606, 9607, and 9622 ("CERCLA") This authority was delegated to the Administrator of EPA on January 23, 1987, by Executive Order 12580, 52 Fed Reg 2926 (Jan 29, 1987), and further delegated to the Regional Administrators on May 11, 1994, by EPA Delegation Nos 14-14-C and 14-14-D This authority was further redelegated by the Regional Administrator to the Director, Superfund Division, by EPA Regional Delegation No R6-14-14-C (June 8, 2001)

3 In accordance with Sections 104(b)(2) and 122(j)(1) of CERCLA, 42 U S C §§ 9604(b)(2) and 9622(j)(1), EPA notified the relevant Federal and/or State natural resource trustees] on 4/13/2005, ~~2004~~, of negotiations with potentially responsible parties regarding the release of hazardous substances that may have resulted in injury to the natural resources under Federal and/or State trusteeship



4 EPA and Respondents recognize that this Order has been negotiated in good faith and that the actions undertaken by Respondents in accordance with this Order do not constitute an admission of any liability. Respondents do not admit, and retain the right to controvert in any subsequent proceedings other than proceedings to implement or enforce this Order, the validity of the findings of fact, conclusions of law and determinations in Sections V and VI of this Order. Respondents agree to comply with and be bound by the terms of this Order and further agree that they will not contest the basis or validity of this Order or its terms.

## **II. PARTIES BOUND**

5 This Order applies to and is binding upon EPA and upon Respondents and their agents, successors, assigns, officers, directors and principals. Any change in the ownership or corporate status of a Respondent, including, but not limited to, any transfer of assets or real or personal property shall not alter such Respondent's responsibilities under this Order.

6 Respondents are jointly and severally liable for carrying out all activities required by this Order. In the event of the insolvency or other failure of any one or more Respondents to implement the requirements of this Order, the remaining Respondents shall complete all such requirements.

7 Respondents shall ensure that their contractors, subcontractors, and representatives receive a copy of this Order and comply with this Order. Respondents shall be responsible for any noncompliance with this Order.

8 Each undersigned representative of Respondents certifies that he or she is fully authorized to enter into the terms and conditions of this Order and to execute and legally bind Respondents to this Order.

## **III. STATEMENT OF PURPOSE**

9 In entering into this Order, the objectives of EPA and Respondents are (a) to determine the nature and extent of contamination and any threat to the public health, welfare, or the environment caused by the release or threatened release of hazardous substances, pollutants or contaminants at or from the Site, by conducting a Remedial Investigation as more specifically set forth in the Statement of Work ("SOW") attached as Appendix A to this Order, (b) to identify and evaluate remedial alternatives to prevent, mitigate or otherwise respond to or remedy any release or threatened release of hazardous substances, pollutants, or contaminants at or from the Site, by conducting a Feasibility Study as more specifically set forth in the SOW in Appendix A to this Order, and (c) to recover response and oversight costs incurred by EPA with respect to the Site.

10 The Work conducted under this Order is subject to approval by EPA and shall provide all appropriate and necessary information to assess Site conditions and evaluate alternatives to the extent necessary to select a remedy that will be consistent with CERCLA and the National Oil and Hazardous Substances Pollution Contingency Plan, 40 C.F.R. Part 300 ("NCP"). Respondents shall conduct all Work under this Order in compliance with CERCLA, the NCP, and all applicable EPA guidances, policies, and procedures.

## **IV. DEFINITIONS**

11 Unless otherwise expressly provided herein, terms used in this Order that are defined in CERCLA or in regulations promulgated under CERCLA shall have the meaning assigned to

them in CERCLA or in such regulations. Whenever terms listed below are used in this Order or in the appendices attached hereto and incorporated hereunder, the following definitions shall apply:

a "CERCLA" shall mean the Comprehensive Environmental Response, Compensation, and Liability Act of 1980, as amended, 42 U.S.C. §§ 9601, *et seq*

b "Day" shall mean a calendar day. In computing any period of time under this Order, where the last day would fall on a Saturday, Sunday, or federal holiday, the period shall run until the close of business of the next working day.

c "Effective Date" shall mean the effective date of this Order as provided in Section XXXI.

d "EPA" shall mean the United States Environmental Protection Agency and any successor departments or agencies of the United States.

e "Future Response Costs" shall mean all costs, including, but not limited to, direct and indirect costs that the United States incurs in reviewing or developing plans, reports and other items pursuant to this Order, verifying the Work, or otherwise implementing, overseeing, or enforcing this Order, including but not limited to, payroll costs, contractor costs, travel costs, laboratory costs, Agency for Toxic Substances and Disease Registry ("ATSDR") costs, the costs incurred pursuant to Paragraph 56 (costs and attorneys fees and any monies paid to secure access, including the amount of just compensation), Paragraph 42 (emergency response), and Paragraph 87 (Work takeover).

f "Interest" shall mean interest at the rate specified for interest on investments of the EPA Hazardous Substance Superfund established by 26 U.S.C. § 9507, compounded annually, in accordance with 42 U.S.C. § 9607(a). The applicable rate of interest shall be the rate in effect at the time the interest accrues. The rate of interest is subject to change on October 1 of each year.

g "LDEQ" shall mean the Louisiana Department of Environmental Quality and any successor departments or agencies of the State of Louisiana.

h "NCP" shall mean the National Oil and Hazardous Substances Pollution Contingency Plan promulgated pursuant to Section 105 of CERCLA, 42 U.S.C. § 9605, codified at 40 C.F.R. Part 300, and any amendments thereto.

i "Order" shall mean this Administrative Order on Consent, the SOW, all appendices attached hereto (listed in Section XXIX), any amendments pursuant to Section XXXI of this Order, and all documents incorporated by reference into this document including without limitation EPA-approved submissions. EPA-approved submissions (other than progress reports) are incorporated into and become a part of the Order upon approval by EPA. In the event of conflict between this Order and any appendix or other incorporated documents, this Order shall control.

j "Paragraph" shall mean a portion of this Order identified by an Arabic numeral.

k "Parties" shall mean EPA and Respondents.

l “RCRA” shall mean the Resource Conservation and Recovery Act, also known as the Solid Waste Disposal Act, as amended, 42 U S C §§ 6901, *et seq*

m “Respondents” shall mean Clean Harbors Environmental Services, Inc and Safety-Kleen Systems, Inc

n “Section” shall mean a portion of this Order identified by a Roman numeral

o “Site” shall mean the Devil’s Swamp Lake Superfund Site, encompassing approximately 39 acres, located in the central region of Devil’s Swamp, East Baton Rouge Parish, Louisiana and depicted generally on the map attached as Appendix B

p “State” shall mean the State of Louisiana

q “Statement of Work” or “SOW” shall mean the Statement of Work for development of a RI/FS for the Site, as set forth in Appendix A to this Order The Statement of Work is incorporated into this Order and is an enforceable part of this Order as are any modifications made thereto in accordance with this Order

r “Waste Material” shall mean (1) any “hazardous substance” under Section 101(14) of CERCLA, 42 U S C § 9601(14), (2) any pollutant or contaminant under Section 101(33) of CERCLA, 42 U S C § 9601(33), and (3) any “solid waste” under Section 1004(27) of RCRA, 42 U S C § 6903(27)

s “Work” shall mean all activities Respondents are required to perform under this Order, except those required by Section XIV (Retention of Records)

## **V. FINDINGS OF FACT**

12 Devil’s Swamp Lake is a large flood plain area which consists of Devil’s Swamp, Devil’s Swamp Lake, Bayou Baton Rouge and surrounding properties near Scotlandville, East Baton Rouge Parish, Louisiana

13 The Devil’s Swamp Lake Superfund Site is generally bordered by the northern portions of Bayou Baton Rouge to the north, U S Highway 61 - (scenic highway), the Ewell farm, Clean Harbors Baton Rouge, LLC [a k a Safety Kleen, Inc , a k a Laidlaw Environmental Services, Inc , a k a Rollins Environmental Services (LA), Inc ], and the Baton Rouge barge harbor to the east, and the Mississippi River to the south and west The Devil’s Swamp Superfund Site consists of contaminated sediments within Devil’s Swamp Lake, a portion of Devil’s Swamp adjoining the lake, and associated wetlands The lake was excavated from Devil’s Swamp in 1973 and is surrounded by low-lying bottom lands that grade into the swamp toward the Mississippi River The lake is subject to sheet flow from Bayou Baton Rouge through Devil’s Swamp, discharges and stormwater runoff from the former Rollins Environmental Services (LA), Inc property, stormwater runoffs from the Baton Rouge Port Commission property and other nearby industrial properties The lake is also subject to seasonal backwater flooding of the Mississippi River The lake also received past discharges from the wastewater effluent of the former Rollins Environmental Services (LA), Inc facility

14 The Devil’s Swamp Lake Superfund Site specifically excludes any releases from the existing Petro Processors of Louisiana, Inc (Petro) National Priorities List (NPL) site (LAD057482713) located in the Devil’s Lake watershed The releases from the Petro site are

being remediated pursuant to a Consent Decree entered in the United States District Court for the Middle District of Louisiana on February 16, 1984

15 Prior LDEQ investigations along the lake and the drainage ditch to the former Rollins Environmental Services (LA) Inc outfall, conducted in 1985 and 1986, documented the presence of elevated levels of polychlorinated biphenyls (PCBs) within the drainage ditch and Devil's Swamp Lake sediments. Subsequent investigations were conducted in 1994 during joint LDEQ/EPA Expanded Site Inspections. These investigations confirmed the accumulation of PCBs within Devil's Swamp Lake sediments. Investigations conducted by the facility confirmed the presence of PCBs in the drainage ditch, now currently under remediation under RCRA corrective action authorities. The EPA and the United States Geological Survey (USGS) collected sediment samples from Devil's Swamp Lake as part of an "Immunoassay Screening of Sediment Cores for PCBs at Devil's Swamp Lake" in October 2004. This investigation revealed that PCBs have been deposited in the lake sediments since the mid 1970s. The EPA completed an "Aerial Photographic Analysis of Devil's Swamp Lake Site" in December 2004. The report covers a twenty year period from 1968 to 1988, and noted drainage pathways from the former Rollins Environmental Services (LA), Inc site into the drainage ditch that eventually discharges into Devil's Swamp Lake. The report also identified culverts, breaches, stains, standing liquids, spillage, and other signs of runoff outside the facility.

16 Elements and compounds which are hazardous substances as defined in Section 101(14) of CERCLA, 42 U.S.C. § 9601(14), and 40 C.F.R. § 302 were found at elevated levels at the Site. The 1999 report "Human Health Risk Assessment Devil's Swamp, Baton Rouge, Louisiana" revealed that PCBs have been found at levels of concern in sediments, fish, and crawfish in Devil's Swamp Lake and areas southward to the Mississippi River. The EPA's acceptable risk range for the consumption of locally caught fish and crawfish is exceeded in the Devil's Swamp Lake area, and these exceedences of Reasonable Maximum Exposure (RME) cancer risks are due almost exclusively to the presence of PCBs in edible fish and crawfish tissues. The RME non-cancer hazards also exceed the EPA's acceptable hazard goal of less than 1. Over the entire Devil's Swamp, an area of approximately 3,500 acres, several chemicals of potential concern (COPCs) were identified using a risk-based screening concentration (RBSC) process which incorporated very conservative exposure and toxicity assumptions. These included chlorinated benzenes, PCBs, and a few pesticides. A distinct gradient indicates chlorinated benzenes are associated to the Petro site. PCBs have been found in Devil's Swamp Lake (a separate and distinct area within Devil's Swamp), the Site under this Order, the south swamp and areas immediately adjacent to the lake. The few occurrences of pesticides are not related to any particular contamination gradient and are believed to be representative of anthropogenic background levels.

17 Exposure to elevated levels of the substances identified in Paragraph 16 above can result in acute and chronic toxicity to sediment-dwelling organisms. Furthermore, exposure of benthic organisms to these compounds in sediment can adversely affect their survival, growth, and reproduction. Toxicity tests for percent survival have been conducted on selected species of aquatic life. The survival rates indicate the presence of toxic sediments in Devil's Swamp Lake.

The PCBs that are released into aquatic ecosystems pose a number of potential risks to aquatic and terrestrial organisms. Although water-borne PCBs can be acutely lethal to invertebrates, fish, and amphibians, the primary concerns associated with PCBs are effects on survival, growth and reproduction from long-term exposures. Similarly, exposure to sediment-associated PCBs can adversely affect the survival, growth, and reproduction of benthic invertebrates and, potentially, benthic fish species. Accumulation of PCBs in the tissues of aquatic organisms can adversely

affect the survival, growth, and reproduction of aquatic-dependent avian and mammalian wildlife species (i.e., those species that consume aquatic invertebrates and/or fish)

18 The Devil's Swamp Lake site was proposed to the National Priorities List on March 8, 2004 (69 FR 10646)

19 Clean Harbors Environmental Services, Inc, is the current owner and operator of the former Rollins Environmental Services (LA), Inc facility Safety-Kleen Systems, Inc, is a former owner and operator of the former Rollins Environmental Services (LA), Inc facility

20 On December 1, 2003, the EPA issued a General Notice Letter to Clean Harbors Environmental Services, Inc, current owner and operator, notifying them of the potential liability that they have incurred or may have incurred with respect to the Site On August 17, 2004, the EPA issued a General Notice Letter to Safety-Kleen Systems, Inc, former owner and operator, notifying them of potential liability that they have incurred or may have incurred with respect to the Site

## **VI. CONCLUSIONS OF LAW AND DETERMINATIONS**

Based on the Findings of Fact set forth above, EPA has determined that

21 The Devil's Swamp Lake Superfund Site is a "facility" as defined in Section 101(9) of CERCLA, 42 U.S.C. § 9601(9)

22 The contamination found at the Site, as identified in the Findings of Fact above, includes "hazardous substances" as defined in Section 101(14) of CERCLA, 42 U.S.C. § 9601(14), or constitute "any pollutant or contaminant" that may present an imminent and substantial danger to public health or welfare under section 104(a)(1) of CERCLA

23 The presence of hazardous substances at the Site or the past, present or potential migration of hazardous substances currently located at or emanating from the Site, constitute actual and/or threatened "releases" as defined in section 101(22) of CERCLA, 42 U.S.C. § 9601(22)

24 Each Respondent is a "person" as defined in section 101(21) of CERCLA, 42 U.S.C. § 9601(21)

25 Respondents are responsible parties under sections 104, 107 and 122 of CERCLA, 42 U.S.C. §§ 9604, 9607 and 9622

26 The actions required by this Order are necessary to protect the public health or welfare or the environment, are in the public interest, 42 U.S.C. § 9622(a), are consistent with CERCLA and the NCP, 42 U.S.C. §§ 9604(a)(1), 9622(a), and will expedite effective remedial action and minimize litigation, 42 U.S.C. § 9622(a)

27 EPA has determined that Respondents are qualified to conduct the RI/FS within the meaning of Section 104(a) of CERCLA, 42 U.S.C. § 9604(a), and will carry out the Work properly and promptly, in accordance with Sections 104(a) and 122(a) of CERCLA, 42 U.S.C. §§ 9604(a) and 9622(a), if Respondents comply with the terms of this Order

## **VII. ORDER**

28 Based upon the foregoing Findings of Fact and Conclusions of Law and Determinations, it is hereby Ordered and Agreed that Respondents shall comply with all provisions of this Order, including, but not limited to, all appendices to this Order and all documents incorporated by reference into this Order

### **VIII. DESIGNATION OF CONTRACTORS AND PROJECT COORDINATORS**

29 Selection of Contractors, Personnel All Work performed under this Order shall be under the direction and supervision of qualified personnel Within 30 days of the Effective Date of this Order, and before the Work outlined below begins, Respondents shall notify EPA in writing of the names, titles, and qualifications of the personnel, including contractors, subcontractors, consultants and laboratories to be used in carrying out such Work With respect to any proposed contractor, Respondents shall demonstrate that the proposed contractor has a quality system which complies with ANSI/ASQC E4-1994, "Specifications and Guidelines for Quality Systems for Environmental Data Collection and Environmental Technology Programs," (American National Standard, January 5, 1995, or most recent version), by submitting a copy of the proposed contractor's Quality Management Plan ("QMP") The QMP should be prepared in accordance with "EPA Requirements for Quality Management Plans (QA/R-2)," (EPA/240/B-01/002, March 2001 or subsequently issued guidance) or equivalent documentation as determined by EPA EPA may consider laboratories accredited under the National Environmental Laboratory Accreditation Program (NELAP) to meet the quality system requirements The qualifications of the persons undertaking the Work for Respondents shall be subject to EPA's review, for verification that such persons meet minimum technical background and experience requirements This Order is contingent on Respondents' demonstration to EPA's satisfaction that Respondents are qualified to perform properly and promptly the actions set forth in this Order If EPA disapproves in writing of any person's technical qualifications, Respondents shall notify EPA of the identity and qualifications of the replacements within 30 days of the written notice If EPA subsequently disapproves of the replacement, EPA reserves the right to terminate this Order and to conduct a complete RI/FS, and to seek reimbursement for costs and penalties from Respondents During the course of the RI/FS, Respondents shall notify EPA in writing of any changes or additions in the personnel used to carry out such Work, providing their names, titles, and qualifications EPA shall have the same right to disapprove changes and additions to personnel as it has hereunder regarding the initial notification

30 On or before the Effective Date, Respondents shall designate a Project Coordinator who shall be responsible for administration of all actions by Respondents required by this Order and shall submit to EPA the designated Project Coordinator's name, address, telephone number, and qualifications To the greatest extent possible, the Project Coordinator shall be present on Site or readily available during Site Work EPA retains the right to disapprove of the designated Project Coordinator If EPA disapproves of the designated Project Coordinator, Respondents shall retain a different Project Coordinator and shall notify EPA of that person's name, address, telephone number and qualifications within 10 days following EPA's disapproval Respondents shall have the right to change their Project Coordinator, subject to EPA's right to disapprove Respondents shall notify EPA 10 days before such a change is made The initial notification may be made orally, but shall be promptly followed by a written notification Receipt by Respondents' Project Coordinator of any notice or communication from EPA relating to this Order shall constitute receipt by Respondents Documents to be submitted to the Respondents shall be sent to [insert name, title, organization and address of Respondents' Project Coordinator]

31 EPA has designated Bartolome J Cañellas of the Superfund Division, EPA Region 6, as its Project Coordinator EPA will notify Respondents of a change of its designated Project

Coordinator Except as otherwise provided in this Order, Respondents shall direct all submissions required by this Order to the Project Coordinator at U S EPA Region 6, Superfund Division (6SF-LP), 1445 Ross Avenue, Suite 1200, Dallas, Texas 75202, by certified mail, return receipt requested

32 EPA's Project Coordinator shall have the authority lawfully vested in a Remedial Project Manager ("RPM") and On-Scene Coordinator ("OSC") by the NCP In addition, EPA's Project Coordinator shall have the authority consistent with the NCP, to halt any Work required by this Order, and to take any necessary response action when s/he determines that conditions at the Site may present an immediate endangerment to public health or welfare or the environment The absence of the EPA Project Coordinator from the area under study pursuant to this Order shall not be cause for the stoppage or delay of Work

33 EPA shall arrange for a qualified person to assist in its oversight and review of the conduct of the RI/FS, as required by Section 104(a) of CERCLA, 42 U S C Section 9604(a) Such person shall have the authority to observe Work and make inquiries in the absence of EPA, but not to modify the RI/FS Work Plan

## **IX. WORK TO BE PERFORMED**

34 Respondents shall conduct the Work in accordance with the provisions of this Order, the SOW, CERCLA, the NCP, and EPA guidance including, but not limited to, the "Interim Final Guidance for Conducting Remedial Investigations and Feasibility Studies under CERCLA" (OSWER Directive # 9355 3-01, October 1988, or subsequently issued guidance), "Guidance for Data Usability in Risk Assessment" (OSWER Directive #9285 7-05, October 1990 or subsequently issued guidance), and guidance referenced therein, and guidances referenced in the Statement of Work, as may be amended or modified by EPA The Remedial Investigation ("RI") shall consist of collecting data to characterize site conditions, determining the nature and extent of the contamination at or from the Site, assessing risk to human health and the environment and conducting treatability testing as necessary to evaluate the potential performance and cost of the treatment technologies that are being considered The Feasibility Study ("FS") shall determine and evaluate (based on treatability testing, where appropriate) alternatives for remedial action to prevent, mitigate or otherwise respond to or remedy the release or threatened release of hazardous substances, pollutants or contaminants at or from the Site The alternatives evaluated must include, but shall not be limited to, the range of alternatives described in the NCP, and shall include remedial actions that utilize permanent solutions and alternative treatment technologies or resource recovery technologies to the maximum extent practicable In evaluating the alternatives, Respondents shall address the factors required to be taken into account by Section 121 of CERCLA, 42 U S C § 9621, and Section 300 430(e) of the NCP, 40 C F R § 300 430(e) Upon request by EPA, Respondents shall submit in electronic form all portions of any plan, report or other deliverable Respondents are required to submit pursuant to provisions of this Order

35 The tasks that Respondents must perform are described more fully in the Statement of Work and guidances The activities and deliverables identified in the SOW shall be submitted to EPA as provided in the SOW All work performed under this Order shall be in accordance with the schedules herein or established in the SOW, and in full accordance with the standards, specifications, and other requirements of the work plan and sampling and analysis plan, as initially approved or modified by EPA, and as may be amended or modified by EPA from time to time

36 In accordance with the schedules established in this Order or in the SOW, Respondents shall submit to EPA and the State \_\_\_\_\_ copies of all plans, reports, submittals and



other deliverables required under this Order, the SOW and the RI/FS Work Plan. All plans, reports, submittals and other deliverables will be reviewed by EPA pursuant to Section X (EPA Approval of Plans and Other Submissions). Upon request by EPA, Respondents shall submit in electronic form all portions of any report or other deliverable. Respondents are required to submit pursuant to provisions of this Order.

37 Upon receipt of the draft FS report, EPA will evaluate, as necessary, the estimates of the risk to the public and environment that are expected to remain after a particular remedial alternative has been completed and will evaluate the durability, reliability and effectiveness of any proposed Institutional Controls.

38 Modification of the RI/FS Work Plan

a If at any time during the RI/FS process, Respondents identify a need for additional data, Respondents shall submit a memorandum documenting the need for additional data to the EPA Project Coordinator within 20 days of identification. EPA in its discretion will determine whether the additional data will be collected by Respondents and whether it will be incorporated into reports and other deliverables.

b In the event of unanticipated or changed circumstances at the Site, Respondents shall notify the EPA Project Coordinator by telephone within 24 hours of discovery of the unanticipated or changed circumstances. In addition to the authorities in the NCP, in the event that EPA determines that the immediate threat or the unanticipated or changed circumstances warrant changes in the RI/FS Work Plan, EPA shall modify or amend the RI/FS Work Plan in writing accordingly. Respondents shall perform the RI/FS Work Plan as modified or amended.

c EPA may determine that in addition to tasks defined in the initially approved RI/FS Work Plan, other additional Work may be necessary to accomplish the objectives of the RI/FS. Respondents agree to perform these response actions in addition to those required by the initially approved RI/FS Work Plan, including any approved modifications, if EPA determines that such actions are necessary for a complete RI/FS.

d Respondents shall confirm their willingness to perform the additional Work in writing to EPA within 7 days of receipt of the EPA request. If Respondents object to any modification determined by EPA to be necessary pursuant to this Paragraph, Respondents may seek dispute resolution pursuant to Section XVI (Dispute Resolution). The SOW and/or RI/FS Work Plan shall be modified in accordance with the final resolution of the dispute.

e Respondents shall complete the additional Work according to the standards, specifications, and schedule set forth or approved by EPA in a written modification to the RI/FS Work Plan or written RI/FS Work Plan supplement. EPA reserves the right to conduct the Work itself at any point, to seek reimbursement from Respondents, and/or to seek any other appropriate relief.

f Nothing in this Paragraph shall be construed to limit EPA's authority to require performance of further response actions at the Site.

39 Off-Site Shipment of Waste Material Respondents shall, prior to any off-site shipment of Waste Material from the Site to an out-of-state waste management facility, provide written notification of such shipment of Waste Material to the appropriate state environmental official in the receiving facility's state and to EPA's Designated Project Coordinator. However,

this notification requirement shall not apply to any off-site shipments when the total volume of all such shipments will not exceed 10 cubic yards

a Respondents shall include in the written notification the following information (1) the name and location of the facility to which the Waste Material is to be shipped, (2) the type and quantity of the Waste Material to be shipped, (3) the expected schedule for the shipment of the Waste Material, and (4) the method of transportation Respondents shall notify the state in which the planned receiving facility is located of major changes in the shipment plan, such as a decision to ship the Waste Material to another facility within the same state, or to a facility in another state

b The identity of the receiving facility and state will be determined by Respondents following the award of the contract for the remedial investigation and feasibility study Respondents shall provide the information required by Subparagraph 39 a and 39 c as soon as practicable after the award of the contract and before the Waste Material is actually shipped

c Before shipping any hazardous substances, pollutants, or contaminants from the Site to an off-site location, Respondents shall obtain EPA's certification that the proposed receiving facility is operating in compliance with the requirements of CERCLA Section 121(d)(3), 42 U S C § 9621(d)(3), and 40 C F R § 300.440 Respondents shall only send hazardous substances, pollutants, or contaminants from the Site to an off-site facility that complies with the requirements of the statutory provision and regulation cited in the preceding sentence

40 Meetings Respondents shall make presentations at, and participate in, meetings at the request of EPA during the initiation, conduct, and completion of the RI/FS In addition to discussion of the technical aspects of the RI/FS, topics will include anticipated problems or new issues Meetings will be scheduled at EPA's discretion

41 Progress Reports In addition to the plans, reports, and other deliverables set forth in this Order, Respondents shall provide to EPA monthly progress reports by the 10th day of the following month At a minimum, with respect to the preceding month, these progress reports shall (1) describe the actions which have been taken to comply with this Order during that month, (2) include all results of sampling and tests and all other data received by Respondents, (3) describe Work planned for the next two months with schedules relating such Work to the overall project schedule for RI/FS completion, and (4) describe all problems encountered and any anticipated problems, any actual or anticipated delays, and solutions developed and implemented to address any actual or anticipated problems or delays

#### 42 Emergency Response and Notification of Releases

a In the event of any action or occurrence during performance of the Work which causes or threatens a release of Waste Material from the Site that constitutes an emergency situation or may present an immediate threat to public health or welfare or the environment, Respondents shall immediately take all appropriate action Respondents shall take these actions in accordance with all applicable provisions of this Order, including, but not limited to, the Health and Safety Plan, in order to prevent, abate or minimize such release or endangerment caused or threatened by the release Respondents shall also immediately notify the EPA Project Coordinator or, in the event of his/her unavailability, the On Scene Coordinator ("OSC") or the Regional Duty Officer of the incident or Site conditions The Regional Duty Officer's (Emergency Planning and Response Branch, EPA Region 6) telephone number is 214-665-6428 The EPA Regional Emergency 24-hour telephone number is 866-372-7745 In the event that Respondents fail to

take appropriate response action as required by this Paragraph, and EPA takes such action instead, Respondents shall reimburse EPA all costs of the response action not inconsistent with the NCP pursuant to Section XIX (Payment of Response Costs)

b In addition, in the event of any release of a hazardous substance from the Site, Respondents shall immediately notify the EPA Project Coordinator, the OSC or Regional Duty Officer at 866-372-7745 and the National Response Center at (800) 424-8802 Respondents shall submit a written report to EPA within 7 days after each release, setting forth the events that occurred and the measures taken or to be taken to mitigate any release or endangerment caused or threatened by the release and to prevent the reoccurrence of such a release This reporting requirement is in addition to, and not in lieu of, reporting under Section 103(c) of CERCLA, 42 U S C § 9603(c), and Section 304 of the Emergency Planning and Community Right-To-Know Act of 1986, 42 U S C § 11004, *et seq*

## **X. EPA APPROVAL OF PLANS AND OTHER SUBMISSIONS**

43 After review of any plan, report or other item that is required to be submitted for approval pursuant to this Order, EPA shall (a) approve, in whole or in part, the submission, (b) approve the submission upon specified conditions, (c) modify the submission to cure the deficiencies, (d) disapprove, in whole or in part, the submission, directing that Respondents modify the submission, or (e) any combination of the above However, EPA shall not modify a submission without first providing Respondents at least one notice of deficiency and an opportunity to cure within 10 days, except where to do so would cause serious disruption to the Work or where previous submission(s) have been disapproved due to material defects At EPA's discretion, Respondents shall fully correct all deficiencies identified by EPA and incorporate and integrate all information and comments supplied by EPA either in subsequent or resubmitted deliverables

44 In the event of approval, approval upon conditions, or modification by EPA, pursuant to Subparagraph 43(a), (b), (c) or (e), Respondents shall proceed to take any action required by the plan, report or other deliverable, as approved or modified by EPA subject only to their right to invoke the Dispute Resolution procedures set forth in Section XVI (Dispute Resolution) with respect to the modifications or conditions made by EPA Following EPA approval or modification of a submittal or portion thereof, Respondents shall not thereafter alter or amend such submittal or portion thereof unless directed by EPA In the event that EPA modifies the submission to cure the deficiencies pursuant to Subparagraph 43(c) and the original submission had a material defect, EPA retains the right to seek stipulated penalties, as provided in Section XVII (Stipulated Penalties)

### **45 Resubmission of Plans**

a Upon receipt of a notice of disapproval, Respondents shall, within 10 days or such longer time as specified by EPA in such notice, correct the deficiencies and resubmit the plan, report, or other item for approval

b Notwithstanding the receipt of a notice of disapproval, Respondents shall proceed to take any action required by any non-deficient portion of the submission, unless otherwise directed by EPA Implementation of any non-deficient portion of a submission shall not relieve Respondents of any liability for stipulated penalties under Section XVII (Stipulated Penalties)

c Respondents shall not proceed further with any subsequent activities or tasks until receiving EPA approval for the following deliverables RI/FS Work Plan and Sampling and Analysis Plan, Baseline Human Health Risk Assessment, Baseline Ecological Risk Assessment Report, Draft Remedial Investigation Report, Treatability Testing Work Plan and Sampling and Analysis Plan, and Draft Feasibility Study Report While awaiting EPA approval on these deliverables, Respondents shall proceed with all other tasks and activities which may be conducted independently of these deliverables, in accordance with the schedule set forth in this Order

d For all remaining deliverables not enumerated above in subparagraph 45c , Respondents shall proceed with all subsequent tasks, activities and deliverables without awaiting EPA approval on the submitted deliverable EPA reserves the right to stop Respondents from proceeding further, either temporarily or permanently, on any task, activity or deliverable at any point during the RI/FS

46 If EPA disapproves a resubmitted plan, report or other deliverable, or portion thereof, EPA may again direct Respondents to correct the deficiencies EPA shall also retain the right to modify or develop the plan, report or other deliverable Respondents shall implement any such plan, report, or deliverable as corrected, modified or developed by EPA, subject only to their right to invoke the procedures set forth in Section XVI (Dispute Resolution)

47 If upon resubmission, a plan, report, or other deliverable is disapproved or modified by EPA, Respondents shall be deemed to have failed to submit such plan, report, or other deliverable timely and adequately unless Respondents invoke the dispute resolution procedures in accordance with Section XVI (Dispute Resolution) and EPA's action is revoked or substantially modified pursuant to a Dispute Resolution decision issued by EPA or superceded by an agreement reached pursuant to that Section The provisions of Section XVI (Dispute Resolution) and Section XVII (Stipulated Penalties) shall govern the implementation of the Work and accrual and payment of any stipulated penalties during Dispute Resolution If EPA's disapproval or modification is not otherwise revoked, substantially modified or superceded as a result of a decision or agreement reached pursuant to the Dispute Resolution process set forth in Section XVI, stipulated penalties shall accrue for such violation from the date on which the initial submission was originally required, as provided in Section XVII

48 In the event that EPA takes over some of the tasks, but not the preparation of the RI Report or the FS Report, Respondents shall incorporate and integrate information supplied by EPA into the final reports

49 All plans, reports, and other deliverables submitted to EPA under this Order shall, upon approval or modification by EPA, be incorporated into and enforceable under this Order In the event EPA approves or modifies a portion of a plan, report, or other deliverable submitted to EPA under this Order, the approved or modified portion shall be incorporated into and enforceable under this Order

50 Neither failure of EPA to expressly approve or disapprove of Respondents' submissions within a specified time period, nor the absence of comments, shall be construed as approval by EPA Whether or not EPA gives express approval for Respondents' deliverables, Respondents are responsible for preparing deliverables acceptable to EPA

## **XI. QUALITY ASSURANCE, SAMPLING, AND ACCESS TO INFORMATION**

51 Quality Assurance Respondents shall assure that Work performed, samples taken and analyses conducted conform to the requirements of the SOW, the QAPP and guidances identified therein. Respondents will assure that field personnel used by Respondents are properly trained in the use of field equipment and in chain of custody procedures. Respondents shall only use laboratories which have a documented quality system that complies with "EPA Requirements for Quality Management Plans (QA/R-2)" (EPA/240/B-01/002, March 2001) or equivalent documentation as determined by EPA.

52 Sampling

a All results of sampling, tests, modeling or other data (including raw data) generated by Respondents, or on Respondents' behalf, during the period that this Order is effective, shall be submitted to EPA in the next monthly progress report as described in Paragraph 41 of this Order. EPA will make available to Respondents validated data generated by EPA unless it is exempt from disclosure by any federal or state law or regulation.

b Respondents shall verbally notify EPA at least 15 days prior to conducting significant field events as described in the SOW, RI/FS Work Plan or Sampling and Analysis Plan. At EPA's verbal or written request, or the request of EPA's oversight assistant, Respondents shall allow split or duplicate samples to be taken by EPA (and its authorized representatives) of any samples collected in implementing this Order. All split samples of Respondents shall be analyzed by the methods identified in the QAPP.

53 Access to Information

a Respondents shall provide to EPA, upon request, copies of all documents and information within their possession or control or that of their contractors or agents relating to activities at the Site or to the implementation of this Order, including, but not limited to, sampling, analysis, chain of custody records, manifests, trucking logs, receipts, reports, sample traffic routing, correspondence, or other documents or information related to the Work. Respondents shall also make available to EPA, for purposes of investigation, information gathering, or testimony, their employees, agents, or representatives with knowledge of relevant facts concerning the performance of the Work.

b Respondents may assert business confidentiality claims covering part or all of the documents or information submitted to EPA under this Order to the extent permitted by and in accordance with Section 104(e)(7) of CERCLA, 42 U.S.C. § 9604(e)(7), and 40 C.F.R. § 2.203(b). Documents or information determined to be confidential by EPA will be afforded the protection specified in 40 C.F.R. Part 2, Subpart B. If no claim of confidentiality accompanies documents or information when it is submitted to EPA, or if EPA has notified Respondents that the documents or information are not confidential under the standards of Section 104(e)(7) of CERCLA or 40 C.F.R. Part 2, Subpart B, the public may be given access to such documents or information without further notice to Respondents. Respondents shall segregate and clearly identify all documents or information submitted under this Order for which Respondents assert business confidentiality claims.

c Respondents may assert that certain documents, records and other information are privileged under the attorney-client privilege or any other privilege recognized by federal law. If the Respondents assert such a privilege in lieu of providing documents, they shall provide EPA with the following: 1) the title of the document, record, or information, 2) the date of the document, record, or information, 3) the name and title of the author of the document, record, or information, 4) the name and title of each addressee and recipient, 5) a description of the contents

of the document, record, or information, and 6) the privilege asserted by Respondents. However, no documents, reports or other information created or generated pursuant to the requirements of this Order shall be withheld on the grounds that they are privileged.

d. No claim of confidentiality shall be made with respect to any data, including, but not limited to, all sampling, analytical, monitoring, hydrogeologic, scientific, chemical, or engineering data, or any other documents or information evidencing conditions at or around the Site.

54. In entering into this Order, Respondents waive any objections to any data gathered, generated, or evaluated by EPA, the State or Respondents in the performance or oversight of the Work that has been verified according to the quality assurance/quality control ("QA/QC") procedures required by the Order or any EPA-approved RI/FS Work Plans or Sampling and Analysis Plans. If Respondents object to any other data relating to the RI/FS, Respondents shall submit to EPA a report that specifically identifies and explains its objections, describes the acceptable uses of the data, if any, and identifies any limitations to the use of the data. The report must be submitted to EPA within 15 days of the monthly progress report containing the data.

## **XII. SITE ACCESS AND INSTITUTIONAL CONTROLS**

55. If the Site, or any other property where access is needed to implement this Order, is owned or controlled by any of Respondents, such Respondents shall, commencing on the Effective Date, provide EPA and its representatives, including contractors, with access at all reasonable times to the Site, or such other property, for the purpose of conducting any activity related to this Order.

56. Where any action under this Order is to be performed in areas owned by or in possession of someone other than Respondents, Respondents shall use their best efforts to obtain all necessary access agreements within 30 days after the Effective Date, or as otherwise specified in writing by the EPA Project Coordinator. Respondents shall immediately notify EPA if after using their best efforts they are unable to obtain such agreements. For purposes of this Paragraph, "best efforts" includes the payment of reasonable sums of money in consideration of access. Respondents shall describe in writing their efforts to obtain access. If Respondents cannot obtain access agreements, EPA may either (i) obtain access for Respondents or assist Respondents in gaining access, to the extent necessary to effectuate the response actions described herein, using such means as EPA deems appropriate, (ii) perform those tasks or activities with EPA contractors, or (iii) terminate the Order. Respondents shall reimburse EPA for all costs and attorney's fees incurred by the United States in obtaining such access, in accordance with the procedures in Section XIX (Payment of Response Costs). If EPA performs those tasks or activities with EPA contractors and does not terminate the Order, Respondents shall perform all other tasks or activities not requiring access to that property, and shall reimburse EPA for all costs incurred in performing such activities. Respondents shall integrate the results of any such tasks undertaken by EPA into its reports and deliverables.

57. Notwithstanding any provision of this Order, EPA retains all of its access authorities and rights, including enforcement authorities related thereto, under CERCLA, RCRA, and any other applicable statutes or regulations.

## **XIII. COMPLIANCE WITH OTHER LAWS**

58 Respondents shall comply with all applicable local, state and federal laws when performing the RI/FS. No local, state, or federal permit shall be required for any portion of any action conducted entirely on-site, including studies, if the action is selected and carried out in compliance with Section 121 of CERCLA, 42 U.S.C. § 9621. Where any portion of the Work is to be conducted off-site and requires a federal or state permit or approval, Respondents shall submit timely and complete applications and take all other actions necessary to obtain and to comply with all such permits or approvals. This Order is not, and shall not be construed to be, a permit issued pursuant to any federal or state statute or regulation.

#### **XIV. RETENTION OF RECORDS**

59 During the pendency of this Order and for a minimum of 10 years after commencement of construction of any remedial action, each Respondent shall preserve and retain all non-identical copies of records and documents (including records or documents in electronic form) now in its possession or control or which come into its possession or control that relate in any manner to the performance of the Work or the liability of any person under CERCLA with respect to the Site, regardless of any corporate retention policy to the contrary. Until 10 years after commencement of construction of any remedial action, Respondents shall also instruct their contractors and agents to preserve all documents, records, and information of whatever kind, nature or description relating to performance of the Work.

60 At the conclusion of this document retention period, Respondents shall notify EPA at least 90 days prior to the destruction of any such records or documents, and, upon request by EPA, Respondents shall deliver any such records or documents to EPA. Respondents may assert that certain documents, records and other information are privileged under the attorney-client privilege or any other privilege recognized by federal law. If Respondents assert such a privilege, they shall provide EPA with the following: 1) the title of the document, record, or information, 2) the date of the document, record, or information, 3) the name and title of the author of the document, record, or information, 4) the name and title of each addressee and recipient, 5) a description of the subject of the document, record, or information, and 6) the privilege asserted by Respondents. However, no documents, reports or other information created or generated pursuant to the requirements of this Order shall be withheld on the grounds that they are privileged.

61 Each Respondent hereby certifies individually that to the best of its knowledge and belief, after thorough inquiry, it has not altered, mutilated, discarded, destroyed or otherwise disposed of any records, documents or other information (other than identical copies) relating to its potential liability regarding the Site since notification of potential liability by EPA or the filing of suit against it regarding the Site and that it has fully complied with any and all EPA requests for information pursuant to Sections 104(e) and 122(e) of CERCLA, 42 U.S.C. §§ 9604(e) and 9622(e), and Section 3007 of RCRA, 42 U.S.C. § 6927.

#### **XV. NATURAL RESOURCE DAMAGES**

62 For the purposes of Section 113(g)(1) of CERCLA, the parties agree that, upon issuance of this Order for performance of an RI/FS at the Site, remedial action under CERCLA shall be deemed to be scheduled and an action for damages (as defined in 42 U.S.C. § 9601(6)) must be commenced within 3 years after the completion of the remedial action.

#### **XVI. DISPUTE RESOLUTION**

63 Unless otherwise expressly provided for in this Order, the dispute resolution procedures of this Section shall be the exclusive mechanism for resolving disputes arising under this Order. The Parties shall attempt to resolve any disagreements concerning this Order expeditiously and informally.

64 If Respondents object to any EPA action taken pursuant to this Order, including billings for Future Response Costs, they shall notify EPA in writing of their objection(s) within 14 days of such action, unless the objection(s) has/have been resolved informally. EPA and Respondents shall have 14 days from EPA's receipt of Respondents' written objection(s) to resolve the dispute (the "Negotiation Period"). The Negotiation Period may be extended at the sole discretion of EPA. Such extension may be granted verbally but must be confirmed in writing.

65 Any agreement reached by the Parties pursuant to this Section shall be in writing and shall, upon signature by the Parties, be incorporated into and become an enforceable part of this Order. If the Parties are unable to reach an agreement within the Negotiation Period, an EPA management official at the Branch Chief level or higher will issue a written decision. EPA's decision shall be incorporated into and become an enforceable part of this Order. Respondents' obligations under this Order shall not be tolled by submission of any objection for dispute resolution under this Section. Following resolution of the dispute, as provided by this Section, Respondents shall fulfill the requirement that was the subject of the dispute in accordance with the agreement reached or with EPA's decision, whichever occurs, and regardless of whether Respondents agree with the decision.

## **XVII. STIPULATED PENALTIES**

66 Respondents shall be liable to EPA for stipulated penalties in the amounts set forth in Paragraphs 67, 68, 69, 70, and 71 for failure to comply with any of the requirements of this Order specified below unless excused under Section XVIII (Force Majeure). "Compliance" by Respondents shall include completion of the Work under this Order or any activities contemplated under any RI/FS Work Plan or other plan approved under this Order identified below, in accordance with all applicable requirements of law, this Order, the SOW, and any plans or other documents approved by EPA pursuant to this Order and within the specified time schedules established by and approved under this Order.

67 For each day that the Respondents fail to complete a deliverable in a timely manner or fail to produce a deliverable of acceptable quality, Respondents shall be liable for stipulated penalties below. Where a revised submission by Respondents is required, stipulated penalties shall continue to accrue until a satisfactory deliverable is produced.

a For the following major deliverables, stipulated penalties shall accrue in the amount of \$2,000 per day, per violation, for the first seven days of noncompliance, \$4,000 per day, per violation, for the 8th through 14th day of noncompliance, \$6,000 per day, per violation, for the 15th day through the 30th day, and \$10,000 per day per violation for all violations lasting beyond 30 days.

- (1) Draft and final Preliminary Site Characterization Report
- (2) Draft and final RI/FS Work Plan
- (3) Draft and final Baseline Human Health Risk Assessment



- (4) Draft and final Baseline Ecological Risk Assessment Report
- (5) Draft and final Remedial Investigation Report
- (6) Draft and final Feasibility Study Report

b For the following interim deliverables, stipulated penalties shall accrue in the amount of \$1,500 per day, per violation, for the first week of noncompliance, \$3,000 per day, per violation, for the 8th through 14th day of noncompliance, \$5,000 per day, per violation, for the 15th day through the 30th day of noncompliance, and \$9,000 per day per violation for all violations lasting beyond 30 days

- (1) Draft and final Baseline Ecological Risk Assessment Problem Formulation Report
- (2) Draft and final Baseline Ecological Risk Assessment Work Plan and Sampling and Analysis Plan
- (3) Treatability Studies Work Plan, Sampling and Analysis Plan, and Health and Safety Plan (if required)
- (4) Technical Memorandum on Development and Preliminary Screening of Remedial Alternatives

68 For the monthly progress reports, stipulated penalties shall accrue in the amount of \$1,200 per day, per violation, for the first week of noncompliance, \$2,500 per day, per violation, for the 8th through 14th day of noncompliance, \$5,000 per day, per violation, for the 15th day through the 30th day, and \$8,000 per day, per violation, for all violations lasting beyond 30 days

69 For each failure to cease activity when the EPA Project Coordinator or EPA designated site representative orders either an oral or written cessation or halt of activities pursuant to Paragraph 32 of this Order, the Respondents shall pay a stipulated penalty of \$27,500 per day

70 If EPA exercises its right to undertake the RI/FS pursuant to paragraph 87 of this Order, Respondents shall pay a lump sum penalty of \$500,000

71 For any violation of this Order, with the exceptions listed in paragraphs 67, 68, 69, and 70 above, stipulated penalties shall accrue from the date of violation until the violation is corrected in the amount of \$1,000 per day, per violation for the first week of noncompliance, \$2,500 per day, per violation, for the 8th through 14th day of noncompliance, and \$5,000 per day, per violation for the 15th day and beyond of noncompliance

72 All penalties shall begin to accrue on the day after the complete performance is due or the day a violation occurs, and shall continue to accrue through the final day of the correction of the noncompliance or completion of the activity. However, stipulated penalties shall not accrue (1) with respect to a deficient submission under Section X (EPA Approval of Plans and Other Submissions), during the period, if any, beginning on the 31<sup>st</sup> day after EPA's receipt of such submission until the date that EPA notifies Respondents of any deficiency, and (2) with respect to a decision by the EPA Management Official designated in Paragraph 65 of Section XVI (Dispute Resolution), during the period, if any, beginning on the 21<sup>st</sup> day after the Negotiation Period begins until the date that the EPA Management Official issues a final decision regarding such

dispute Nothing herein shall prevent the simultaneous accrual of separate penalties for separate violations of this Order

73 Following EPA's determination that Respondents have failed to comply with a requirement of this Order, EPA may give Respondents written notification of the same and describe the noncompliance EPA may send Respondents a written demand for the payment of the penalties However, penalties shall accrue as provided in the preceding Paragraph regardless of whether EPA has notified Respondents of a violation

74 All penalties accruing under this Section shall be due and payable to EPA within 30 days of Respondents' receipt from EPA of a demand for payment of the penalties, unless Respondents invoke the dispute resolution procedures in accordance with Section XVI (Dispute Resolution) All payments to EPA under this Section shall be paid by certified or cashier's check(s) made payable to "EPA Hazardous Substances Superfund" Respondents shall make all payments by forwarding the check to

Mellon Bank  
U S EPA Cincinnati Accounting  
Operations - Region 6  
P O Box 371099M  
Pittsburgh, PA 15251

Respondents shall indicate that the payment is for stipulated penalties and shall reference EPA Region 6 and Site/Spill ID Number "06N1", the EPA Docket Number CERCLA \_\_\_\_\_, and the name and address of the parties making payment Copies of the check(s) paid pursuant to this Section, and any accompanying transmittal letter(s), shall be sent to EPA as follows

Chief, Cost Recovery Section (6SF-AC)  
U S Environmental Protection Agency, Region 6  
1445 Ross Avenue  
Dallas, TX 75202-2733

75 The payment of penalties shall not alter in any way Respondents' obligation to complete performance of the Work required under this Order

76 Penalties shall continue to accrue as provided in Paragraph 72 during any dispute resolution period, but need not be paid until 15 days after the dispute is resolved by agreement or by receipt of EPA's decision .

77 If Respondents fail to pay stipulated penalties when due, EPA may institute proceedings to collect the penalties, as well as Interest Respondents shall pay Interest on the unpaid balance, which shall begin to accrue on the date of demand made pursuant to Paragraph 74

78 Nothing in this Order shall be construed as prohibiting, altering, or in any way limiting the ability of EPA to seek any other remedies or sanctions available by virtue of Respondents' violation of this Order or of the statutes and regulations upon which it is based, including, but not limited to, penalties pursuant to Section 122(l) of CERCLA, 42 U S C § 9622(l), and punitive damages pursuant to Section 107(c)(3) of CERCLA, 42 U S C § 9607(c)(3) Provided, however, that EPA shall not seek civil penalties pursuant to Section 122(l) of CERCLA or punitive damages pursuant to Section 107(c)(3) of CERCLA for any violation for which a stipulated penalty is provided herein, except in the case of willful violation of this Order or in the

event that EPA assumes performance of a portion or all of the Work pursuant to Section XXII (Reservation of Rights by EPA), Paragraph 87. Notwithstanding any other provision of this Section, EPA may, in its unreviewable discretion, waive any portion of stipulated penalties that have accrued pursuant to this Order.

### **XVIII. FORCE MAJEURE**

79 Respondents agree to perform all requirements of this Order within the time limits established under this Order, unless the performance is delayed by a *force majeure*. For purposes of this Order, *force majeure* is defined as any event arising from causes beyond the control of Respondents or of any entity controlled by Respondents, including but not limited to their contractors and subcontractors, which delays or prevents performance of any obligation under this Order despite Respondents' best efforts to fulfill the obligation. *Force majeure* does not include financial inability to complete the Work or increased cost of performance.

80 If any event occurs or has occurred that may delay the performance of any obligation under this Order, whether or not caused by a *force majeure* event, Respondents shall notify EPA orally within 48 hours of when Respondents first knew that the event might cause a delay. Within five business days thereafter, Respondents shall provide to EPA in writing an explanation and description of the reasons for the delay, the anticipated duration of the delay, all actions taken or to be taken to prevent or minimize the delay, a schedule for implementation of any measures to be taken to prevent or mitigate the delay or the effect of the delay, Respondents' rationale for attributing such delay to a *force majeure* event if they intend to assert such a claim, and a statement as to whether, in the opinion of Respondents, such event may cause or contribute to an endangerment to public health, welfare or the environment. Failure to comply with the above requirements shall preclude Respondents from asserting any claim of *force majeure* for that event for the period of time of such failure to comply and for any additional delay caused by such failure.

81 If EPA agrees that the delay or anticipated delay is attributable to a *force majeure* event, the time for performance of the obligations under this Order that are affected by the *force majeure* event will be extended by EPA for such time as is necessary to complete those obligations. An extension of the time for performance of the obligations affected by the *force majeure* event shall not, of itself, extend the time for performance of any other obligation. If EPA does not agree that the delay or anticipated delay has been or will be caused by a *force majeure* event, EPA will notify Respondents in writing of its decision. If EPA agrees that the delay is attributable to a *force majeure* event, EPA will notify Respondents in writing of the length of the extension, if any, for performance of the obligations affected by the *force majeure* event.

### **XIX. PAYMENT OF RESPONSE COSTS**

#### **82 Payments for Future Response Costs**

a Respondents shall pay to EPA all Future Response Costs not inconsistent with the NCP. The total estimated Future Response Costs is \$—. Based on this estimate, within thirty days of the effective date of this Order, Respondents shall forward \$100,000.00 to be deposited in the Devil's Swamp Lake Special Account within the Superfund, to be retained and used to conduct or finance response actions at or in connection with the Site.

b On an annual basis the United States will send Respondents a bill requiring payment that includes an EPA Integrated Financial Management System ("IFMS") Itemized Cost Summary.

(SCORPIOS Report or its equivalent) Respondents shall make all payments within 30 days of Respondents' receipt of each bill. Payment shall be made to EPA by Electronic Funds Transfer ("ETF") in accordance with current ETF instructions to be provided to Respondents by EPA Region 6, and shall be accompanied by a statement identifying the name and address of the party(ies) making payment, the Site name, the EPA Region and Site/Spill ID Number 06N1, and the EPA docket number for this action.

c Respondents shall submit notice of payment including a copy of the EFT transmittal documentation to the EPA RPM and to

Chief, Cost Recovery Section (6SF-AC)  
U S Environmental Protection Agency, Region 6  
1445 Ross Avenue  
Dallas, Texas 75202-2733

d Whenever the Devil's Swamp Lake Special Account is drawn down to a balance of approximately \$50,000, EPA will send notice to the Respondents and will provide an adjusted estimate of Future Response Costs to be expended annually. The Respondents shall, within twenty (20) days of a notice and the SCORPIOS Report or its equivalent, remit to the Devil's Swamp Lake Special Account (by EFT) the amount EPA identifies as necessary to replenish the Devil's Swamp Lake Special Account to a balance of \$100,000.00. If the Devil's Swamp Lake Special Account is depleted to an amount of \$10,000.00 or less at the time EPA submits a notification and SCORPIOS Report to the Respondents, the Respondents shall pay, within ten (10) days of EPA's notice, \$40,000.00 to the Devil's Swamp Lake Special Account. Respondent shall remit the remaining amount to replenish the Special Account to \$100,000.00 within twenty (20) days. Prior to close out of this Order, the EPA will send a final bill under this Order. The Respondent shall make such payments according to the procedures described in this Paragraph.

e In the event that the payment of the amount specified in Paragraph 82 is not made within 30 days of the Effective Date of this Order, or the payments for Future Response Costs are not made within 30 days of Respondent's receipt of a bill, Respondent shall pay Interest on the unpaid balance of Future Response Costs, respectively. The interest of unpaid Future Response Costs shall begin to accrue on the date of the bill and shall continue to accrue until the date of payment. If EPA receives partial payment, Interest shall accrue on any unpaid balance. Payments of Interest made under this Paragraph shall be in addition to such other remedies or sanctions available to the United States by virtue of Respondents' failure to make timely payments under this Section, including but not limited to, payment of stipulated penalties pursuant to Section XVII.

f Respondents may dispute all or part of a bill for Future Response Costs submitted under this Order, if Respondents allege that EPA has made an accounting error, or if Respondents allege that a cost item is inconsistent with the NCP. Respondents shall identify any contested costs and the basis of its objection. If any dispute over costs is resolved before payment is due, the amount due will be adjusted as necessary. If the dispute is not resolved before payment is due, Respondents shall pay the full amount of the uncontested costs to EPA as specified in this Paragraph on or before the due date. Within the same period, Respondents shall pay the full amount of the contested costs into an interest-bearing escrow account. Respondents shall simultaneously transmit a copy of both checks to the persons listed in this Paragraph above. Respondents shall ensure that the prevailing party or parties in the dispute shall receive the amount upon which they prevailed from the escrow funds plus interest within 30 days after the dispute is resolved. The dispute resolution procedures set forth in this Paragraph in conjunction

with the procedures set forth in Section XVI (Dispute Resolution) shall be the exclusive mechanisms for resolving disputes regarding Respondents' obligation to reimburse EPA for its Future Response Costs

g Neither dispute resolution nor a request to EPA for more detailed information nor a request for a certified cost accounting shall delay the date that the Respondents' payments are due under this paragraph

## **XX. REIMBURSEMENT OF PAST COSTS**

83 EPA agrees not to seek past response costs in this Consent Order. However, EPA reserves the right to seek recovery of past response costs for which PRPs are responsible under Section 107(a) of CERCLA, 42 U.S.C. § 9607(a). From date of inception through February 28, 2005, the EPA has incurred \$3,895,658.68 in costs at the Site. Such past response costs include all costs, including, but not limited to, direct and indirect costs, that the United States, including, but not limited to, its employees, agents, contractors, consultants, and other authorized representatives, incurred regarding the Site that are not covered as Future Response Costs, as defined in this Consent Order.

## **XXI. COVENANT NOT TO SUE BY EPA**

84 In consideration of the actions that will be performed and the payments that will be made by Respondents under the terms of this Order, and except as otherwise specifically provided in this Order, EPA covenants not to sue or to take administrative action against Respondents pursuant to Sections 106 and 107(a) of CERCLA, 42 U.S.C. §§ 9606 and 9607(a), for the Work performed under this Order and for recovery of Future Response Costs. This covenant not to sue shall take effect upon the Effective Date and is conditioned upon the complete and satisfactory performance by Respondents of all obligations under this Order, including, but not limited to, payment of Future Response Costs pursuant to Section XIX. This covenant not to sue extends only to Respondents and does not extend to any other person.

## **XXII. RESERVATIONS OF RIGHTS BY EPA**

85 Except as specifically provided in this Order, nothing herein shall limit the power and authority of EPA or the United States to take, direct, or order all actions necessary to protect public health, welfare, or the environment or to prevent, abate, or minimize an actual or threatened release of hazardous substances, pollutants or contaminants, or hazardous or solid waste on, at, or from the Site. Further, nothing herein shall prevent EPA from seeking legal or equitable relief to enforce the terms of this Order, from taking other legal or equitable action as it deems appropriate and necessary, or from requiring Respondents in the future to perform additional activities pursuant to CERCLA or any other applicable law.

86 The covenant not to sue set forth in Section XXI above does not pertain to any matters other than those expressly identified therein. EPA reserves, and this Order is without prejudice to, all rights against Respondents with respect to all other matters, including, but not limited to:

- a claims based on a failure by Respondents to meet a requirement of this Order,
- b liability for costs not included within the definition of Future Response Costs,

- c liability for performance of response action other than the Work,
- d criminal liability,
- e liability for damages for injury to, destruction of, or loss of natural resources, and for the costs of any natural resource damage assessments,
- f liability arising from the past, present, or future disposal, release or threat of release of Waste Materials outside of the Site, and
- g liability for costs incurred or to be incurred by the Agency for Toxic Substances and Disease Registry related to the Site

87 Work Takeover In the event EPA determines that Respondents have ceased implementation of any portion of the Work, are seriously or repeatedly deficient or late in their performance of the Work, or are implementing the Work in a manner which may cause an endangerment to human health or the environment, EPA may assume the performance of all or any portion of the Work as EPA determines necessary Respondents may invoke the procedures set forth in Section XVI (Dispute Resolution) to dispute EPA's determination that takeover of the Work is warranted under this Paragraph Costs incurred by EPA in performing the Work pursuant to this Paragraph shall be considered Future Response Costs that Respondents shall pay pursuant to Section XIX (Payment of Response Costs) Notwithstanding any other provision of this Order, EPA retains all authority and reserves all rights to take any and all response actions authorized by law

### **XXIII. COVENANT NOT TO SUE BY RESPONDENTS**

88 Respondents covenant not to sue and agree not to assert any claims or causes of action against the United States, or its contractors or employees, with respect to the Work, Future Response Costs, or this Order, including, but not limited to

- a any direct or indirect claim for reimbursement from the Hazardous Substance Superfund established by 26 U S C § 9507, based on Sections 106(b)(2), 107, 111, 112, or 113 of CERCLA, 42 U S C §§ 9606(b)(2), 9607, 9611, 9612, or 9613, or any other provision of law,
- b any claim arising out of the Work or arising out of the response actions for which the Future Response Costs have or will be incurred, including any claim under the United States Constitution, the Tucker Act, 28 U S C § 1491, the Equal Access to Justice Act, 28 U S C § 2412, as amended, or at common law, or
- c any claim against the United States pursuant to Sections 107 and 113 of CERCLA, 42 U S C §§ 9607 and 9613, relating to the Work or payment of Future Response Costs

89 These covenants not to sue shall not apply in the event the United States brings a cause of action or issues an order pursuant to the reservations set forth in Paragraphs 86 (b), (c), and (e) - (g), but only to the extent that Respondents' claims arise from the same response action, response costs, or damages that the United States is seeking pursuant to the applicable reservation

90 Nothing in this Agreement shall be deemed to constitute approval or preauthorization of a claim within the meaning of Section 111 of CERCLA, 42 U S C § 9611, or 40 C F R § 300.700(d)

91 Respondents agree not to assert any claims and to waive all claims or causes of action that they may have for all matters relating to the Site, including for contribution, against any person where the person's liability to Respondents with respect to the Site is based solely on having arranged for disposal or treatment, or for transport for disposal or treatment, of hazardous substances at the Site, or having accepted for transport for disposal or treatment of hazardous substances at the Site, if all or part of the disposal, treatment, or transport occurred before April 1, 2001, and the total amount of material containing hazardous substances contributed by such person to the Site was less than 110 gallons of liquid materials or 200 pounds of solid materials

92 The waiver in Paragraph 91 shall not apply with respect to any defense, claim, or cause of action that a Respondent may have against any person meeting the above criteria if such person asserts a claim or cause of action relating to the Site against such Respondent. This waiver also shall not apply to any claim or cause of action against any person meeting the above criteria if EPA determines

a that such person has failed to comply with any EPA requests for information or administrative subpoenas issued pursuant to Section 104(e) or 122(e) of CERCLA, 42 U S C §§ 9604(e) or 9622(e), or Section 3007 of the Solid Waste Disposal Act (also known as the Resource Conservation and Recovery Act or "RCRA"), 42 U S C § 6972, or has impeded or is impeding, through action or inaction, the performance of a response action or natural resource restoration with respect to the Site, or has been convicted of a criminal violation for the conduct to which this waiver would apply and that conviction has not been vitiated on appeal or otherwise, or

b that the materials containing hazardous substances contributed to the Site by such person have contributed significantly, or could contribute significantly, either individually or in the aggregate, to the cost of response action or natural resource restoration at the Site

#### **XXIV. OTHER CLAIMS**

93 By issuance of this Order, the United States and EPA assume no liability for injuries or damages to persons or property resulting from any acts or omissions of Respondents

94 Except as expressly provided in Section XXIII, Paragraphs 91 and 92 (Non-Exempt De Micromis Waivers) and Section XXI (Covenant Not to Sue by EPA), nothing in this Order constitutes a satisfaction of or release from any claim or cause of action against Respondents or any person not a party to this Order, for any liability such person may have under CERCLA, other statutes, or common law, including but not limited to any claims of the United States for costs, damages and interest under Sections 106 and 107 of CERCLA, 42 U S C §§ 9606 and 9607

95 No action or decision by EPA pursuant to this Order shall give rise to any right to judicial review except as set forth in Section 113(h) of CERCLA, 42 U S C § 9613(h)

#### **XXV. CONTRIBUTION PROTECTION**

96 The Parties agree that Respondents are entitled, as of the Effective Date, to protection from contribution actions or claims as provided by Sections 113(f)(2) and 122(h)(4) of CERCLA, 42 U S C §§ 9613(f)(2) and 9622(h)(4), for "matters addressed" in this Order. The

“matters addressed” in this Order are the Work and Future Response Costs. Except as expressly provided in Section XXIII, Paragraphs 91 and 92 (Non-Exempt De Micromis Waivers), nothing in this Order precludes the United States or Respondents from asserting any claims, causes of action, or demands against any person not parties to this Order for indemnification, contribution, or cost recovery.

## **XXVI. INDEMNIFICATION**

97 Respondents shall indemnify, save and hold harmless the United States, its officials, agents, contractors, subcontractors, employees and representatives from any and all claims or causes of action arising from, or on account of negligent or other wrongful acts or omissions of Respondents, their officers, directors, employees, agents, contractors, or subcontractors, in carrying out actions pursuant to this Order. In addition, Respondents agree to pay the United States all costs incurred by the United States, including but not limited to attorneys fees and other expenses of litigation and settlement, arising from or on account of claims made against the United States based on negligent or other wrongful acts or omissions of Respondents, their officers, directors, employees, agents, contractors, subcontractors and any persons acting on their behalf or under their control, in carrying out activities pursuant to this Order. The United States shall not be held out as a party to any contract entered into by or on behalf of Respondents in carrying out activities pursuant to this Order. Neither Respondents nor any such contractor shall be considered an agent of the United States.

98 The United States shall give Respondents notice of any claim for which the United States plans to seek indemnification pursuant to this Section and shall consult with Respondents prior to settling such claim.

99 Respondents waive all claims against the United States for damages or reimbursement or for set-off of any payments made or to be made to the United States, arising from or on account of any contract, agreement, or arrangement between any one or more of Respondents and any person for performance of Work on or relating to the Site. In addition, Respondents shall indemnify and hold harmless the United States with respect to any and all claims for damages or reimbursement arising from or on account of any contract, agreement, or arrangement between any one or more of Respondents and any person for performance of Work on or relating to the Site.

## **XXVII. INSURANCE**

100 Prior to commencing any On-Site Work under this Order, Respondents shall secure, and shall maintain for the duration of this Order, comprehensive general liability insurance and automobile insurance with limits of \$5 million dollars, combined single limit, naming the EPA as an additional insured. Within the same period, Respondents shall provide EPA with certificates of such insurance and a copy of each insurance policy. Respondents shall submit such certificates and copies of policies each year on the anniversary of the Effective Date. In addition, for the duration of the Order, Respondents shall satisfy, or shall ensure that their contractors or subcontractors satisfy, all applicable laws and regulations regarding the provision of worker's compensation insurance for all persons performing the Work on behalf of Respondents in furtherance of this Order. If Respondents demonstrate by evidence satisfactory to EPA that any contractor or subcontractor maintains insurance equivalent to that described above, or insurance covering some or all of the same risks but in an equal or lesser amount, then Respondents need provide only that portion of the insurance described above which is not maintained by such contractor or subcontractor.



## XXVIII. FINANCIAL ASSURANCE

101 Within 30 days of the Effective Date, Respondents shall establish and maintain financial security for the benefit of EPA, in the amount sufficient to perform the Work and any other obligations under this Order, in one or more of the following forms, in order to secure the full and final completion of Work by Respondents

a a surety bond unconditionally guaranteeing payment and/or performance of the Work,

b one or more irrevocable letters of credit, payable to or at the direction of EPA, issued by financial institution(s) acceptable in all respects to EPA equaling the total estimated cost of the Work,

c a trust fund administered by a trustee acceptable in all respects to EPA,

d a policy of insurance issued by an insurance carrier acceptable in all respects to EPA, which ensures the payment and/or performance of the Work,

e a corporate guarantee to perform the Work provided by one or more parent corporations or subsidiaries of Respondents, or by one or more unrelated corporations that have a substantial business relationship with at least one of Respondents, including a demonstration that any such company satisfies the financial test requirements of 40 C F R Part 264 143(f), and/or

f a corporate guarantee to perform the Work by one or more of Respondents, including a demonstration that any such Respondent satisfies the requirements of 40 C F R Part 264 143(f)

102 Any and all financial assurance instruments provided pursuant to this Section shall be in form and substance satisfactory to EPA, determined in EPA's sole discretion. In the event that EPA determines at any time that the financial assurances provided pursuant to this Section (including, without limitation, the instrument(s) evidencing such assurances) are inadequate, Respondents shall, within 30 days of receipt of notice of EPA's determination, obtain and present to EPA for approval one of the other forms of financial assurance listed in Paragraph 101, above. In addition, if at any time EPA notifies Respondents that the anticipated cost of completing the Work has increased, then, within 30 days of such notification, Respondents shall obtain and present to EPA for approval a revised form of financial assurance (otherwise acceptable under this Section) that reflects such cost increase. Respondents' inability to demonstrate financial ability to complete the Work shall in no way excuse performance of any activities required under this Order.

103 If Respondents seek to ensure completion of the Work through a guarantee pursuant to Subparagraph 101 e or 101 f of this Order, Respondents shall (i) demonstrate to EPA's satisfaction that the guarantor satisfies the requirements of 40 C F R Part 264 143(f), and (ii) resubmit sworn statements conveying the information required by 40 C F R Part 264 143(f) annually, on the anniversary of the Effective Date, to EPA. For the purposes of this Order, wherever 40 C F R Part 264 143(f) references "sum of current closure and post-closure costs estimates and the current plugging and abandonment costs estimates," the current cost estimate of \$\_\_\_\_\_ for the Work at the Site shall be used in relevant financial test calculations.

104 If, after the Effective Date, Respondents can show that the estimated cost to complete the remaining Work has diminished below the amount set forth in Paragraph 103 of this

Section, Respondents may, on any anniversary date of the Effective Date, or at any other time agreed to by the Parties, reduce the amount of the financial security provided under this Section to the estimated cost of the remaining Work to be performed. Respondents shall submit a proposal for such reduction to EPA, in accordance with the requirements of this Section, and may reduce the amount of the security after receiving written approval from EPA. In the event of a dispute, Respondents may seek dispute resolution pursuant to Section XVI (Dispute Resolution). Respondents may reduce the amount of security in accordance with EPA's written decision resolving the dispute.

105 Respondents may change the form of financial assurance provided under this Section at any time, upon notice to and prior written approval by EPA, provided that EPA determines that the new form of assurance meets the requirements of this Section. In the event of a dispute, Respondents may change the form of the financial assurance only in accordance with the written decision resolving the dispute.

## **XXIX. INTEGRATION/APPENDICES**

106 This Order and its appendices and any deliverables, technical memoranda, specifications, schedules, documents, plans, reports (other than progress reports), etc. that will be developed pursuant to this Order and become incorporated into and enforceable under this Order constitute the final, complete and exclusive agreement and understanding among the Parties with respect to the settlement embodied in this Order. The parties acknowledge that there are no representations, agreements or understandings relating to the settlement other than those expressly contained in this Order. The following appendix is attached to and incorporated into this Order.

"Appendix A" is the SOW

"Appendix B" is the Map of the Site

## **XXX. ADMINISTRATIVE RECORD**

107 EPA will determine the contents of the administrative record file for selection of the remedial action. Respondents shall submit to EPA documents developed during the course of the RI/FS upon which selection of the response action may be based. Upon request of EPA, Respondents shall provide copies of plans, task memoranda for further action, quality assurance memoranda and audits, raw data, field notes, laboratory analytical reports and other reports. Upon request of EPA, Respondents shall additionally submit any previous studies conducted under state, local or other federal authorities relating to selection of the response action, and all communications between Respondents and state, local or other federal authorities concerning selection of the response action. At EPA's discretion, Respondents shall establish a community information repository at or near the Site, to house one copy of the administrative record. EPA retains the responsibility for the release to the public of the RI/FS report. EPA retains responsibility for the preparation and release to the public of the proposed plan and record of decision in accordance with CERCLA and the NCP.

## **XXXI. EFFECTIVE DATE AND SUBSEQUENT MODIFICATION**

108 The effective date of this Order shall be the date it is signed by EPA.

109 This Order may be amended by mutual agreement of EPA and Respondents. Amendments shall be in writing and shall be effective when signed by EPA. EPA Project Coordinators do not have the authority to sign amendments to the Order.

110 No informal advice, guidance, suggestion, or comment by the EPA Project Coordinator or other EPA representatives regarding reports, plans, specifications, schedules, or any other writing submitted by Respondents shall relieve Respondents of their obligation to obtain any formal approval required by this Order, or to comply with all requirements of this Order, unless it is formally modified.

#### **XXXII. NOTICE OF COMPLETION OF WORK**

111 When EPA determines that all Work has been fully performed in accordance with this Order, with the exception of any continuing obligations required by this Order, including but not limited to record retention, EPA will provide written notice to Respondents. If EPA determines that any such Work has not been completed in accordance with this Order, EPA will notify Respondents, provide a list of the deficiencies, and require that Respondents modify the RI/FS Work Plan if appropriate in order to correct such deficiencies, in accordance with Paragraph 38 (Modification of the Work Plan). Failure by Respondents to implement the approved modified RI/FS Work Plan shall be a violation of this Order.

Agreed this \_\_\_\_\_ day of \_\_\_\_\_, 2\_\_\_\_\_

For Respondent \_\_\_\_\_

By \_\_\_\_\_

Title \_\_\_\_\_

It is so ORDERED AND AGREED this \_\_\_\_\_ day of \_\_\_\_\_, 2\_\_\_\_\_

BY \_\_\_\_\_ DATE \_\_\_\_\_

Samuel Coleman, P E  
Director  
Superfund Division

BY \_\_\_\_\_ DATE \_\_\_\_\_ (Respondents)  
Title \_\_\_\_\_

## Appendix A

### STATEMENT OF WORK FOR REMEDIAL INVESTIGATION/FEASIBILITY STUDY (RI/FS) DEVIL'S SWAMP LAKE

#### LIST OF DELIVERABLES AND SCHEDULE

DELIVERABLES/MEETINGS	SCHEDULE
1 Preliminary Site Characterization (Scoping Document) Report Includes Evaluation of Existing Information Preliminary Conceptual Site Model Identification of Potential Technologies Identification of RI/FS Data Needs Preliminary List of ARARS and TBCs	Draft report is due 60 days following EPA approval of AOC and SOW The final report is due within 30 days after receipt of EPA comments
2 Draft and Final RI/FS Work Plan Includes - Project Management Plan - Data Management Plan - Sampling and Analysis Plan (Contains Field Sampling Plan and Quality Assurance/Quality Control Plan) - Health and Safety Plan	Draft RI/FS Work Plan due 90 days after EPA approval of the Preliminary Site Characterization Report The final report is due within 30 days after receipt of EPA comments
3 Remedial Investigation	As specified in the Final RI/FS Work Plan
4 Draft and Final Baseline Human Health Risk Assessment	Draft due as specified in the Final RI/FS Work Plan The final report is due within 30 days after receipt of EPA comments
5 Draft, and Final Screening Level Ecological Risk Assessment Report	Draft due as specified in the Final RI/FS Work Plan The final report is due within 30 days after receipt of EPA comments

6 Draft, and Final Baseline Ecological Risk Assessment Problem Formulation Report	Draft due as specified in the Final RI/FS Work Plan The final report is due within 30 days after receipt of EPA comments
7 Draft and Final Baseline Ecological Risk Assessment Work Plan and Sampling and Analysis Plan	Draft due as specified in the Final RI/FS Work Plan The final report is due within 30 days after receipt of EPA comments
8 Draft, and Final Baseline Ecological Risk Assessment Report	Draft due as specified in the Final RI/FS Work Plan The final report is due within 30 days after receipt of EPA comments
9 Analytical Data Summary	Submitted as needed, for any additional data not included in the standard reports or not included in Monthly Progress Reports
10 Draft and Final Remedial Investigation Report	Draft due as specified in the Final RI/FS Work Plan The final report is due within 30 days after receipt of EPA comments
11 Draft and Final Feasibility Study Report	Draft due as specified in the Final RI/FS Work Plan The final report is due within 30 days after receipt of EPA comments
12 Monthly Progress Reports	Initially due as specified in the RI/FS Work Plan Thereafter, due by the tenth day of the following month

## REFERENCES

The following list, although not comprehensive, contains many of the regulations and guidance documents that apply to the RI/FS process

- 1 National Oil and Hazardous Substances Pollution Contingency Plan, 40 C F R Part 300
- 2 "Guidance for Conducting Remedial Investigations and Feasibility Studies Under CERCLA," U S EPA, Office of Emergency and Remedial Response, October 1988, OSWER Directive No 9355 3-01
- 3 "Interim Guidance on Potentially Responsible Party Participation in Remedial Investigation and Feasibility Studies," U S EPA, Office of Waste Programs Enforcement, Appendix A to OSWER Directive No 9355 3-01
- 4 "Guidance on Oversight of Potentially Responsible Party Remedial Investigations and Feasibility Studies," U S EPA, Office of Waste Programs Enforcement, OSWER Directive No 9835 3
- 5 "Guide to Preparing Superfund Proposed Plans, Records of Decision, and Other Remedy Selection Decision Documents," U S EPA, Office of Solid Waste and Emergency Response, EPA 540-R-98-031, July 1999, OSWER Directive No 9200 1-23P
- 6 "A Compendium of Superfund Field Operations Methods," Two Volumes, U S EPA, Office of Emergency and Remedial Response, EPA/540/P-87/001a, August 1987, OSWER Directive No 9355 0-14
- 7 "EPA NEIC Policies and Procedures Manual," May 1978, revised November 1984, EPA-330/9-78-001-R
- 8 "Interim Guidance on Compliance with Applicable or Relevant and Appropriate Requirements," U S EPA, Office of Emergency and Remedial Response, July 9, 1987, OSWER Directive No 9234 0-05
- 9 "CERCLA Compliance with Other Laws Manual," Two Volumes, U S EPA, Office of Emergency and Remedial Response, August 1988 (draft), OSWER Directive No 9234 1-01 and -02
- 10 "Guidance on Remedial Actions for Contaminated Ground Water at Superfund Sites," U S EPA, Office of Emergency and Remedial Response, (draft), OSWER Directive No 9283 1-2
- 11 "Draft Guidance on Preparing Superfund Decision Documents," U S EPA, Office of Emergency and Remedial Response, March 1988, OSWER Directive No 9355 3-02
- 12 "Performance of Risk Assessments in Remedial Investigation/Feasibility Studies (RI/FSs) Conducted by Potentially Responsible Parties (PRPs)," August 28, 1990, OSWER Directive No 9835 15
- 13 "Role of the Baseline Risk Assessment in Superfund Remedy Selection Decisions," April 22, 1991, OSWER Directive No 9355 0-30
- 14 OSHA Regulations at 29 C F R 1910 120
- 15 "Final Guidance on Administrative Records for Selecting CERCLA Response Actions,"



U S EPA, Office of Waste Programs Enforcement, December 3, 1990,OSWER Directive No 9833 3A

16 "Community Relations in Superfund A Handbook," U S EPA, Office of Emergency and Remedial Response, June 1988, OSWER Directive No 9230 0#3B

17 "Community Relations During Enforcement Activities And Development of the Administrative Record," U S EPA, Office of Programs Enforcement, November 1988, OSWER Directive No 9836 0-1A

18 EPA 1997 "Ecological Risk Assessment Guidance for Superfund, Process for Designing and Conducting Ecological Risk Assessments " Office of Emergency and Remedial Response EPA/540-R-97-006 June 5, 1997

19 U S Environmental Protection Agency (EPA) 1987a "Data Quality Objectives for Remedial Response Activities " Office of Emergency and Remedial Response and Office of Waste Programs Enforcement EPA/540/G-87/003 OSWER Directive No 9335 0-7b March 1987

20 EPA 1991a "Human Health Evaluation Manual, Supplemental Guidance Standard Default Exposure Factors " Office of Emergency and Remedial Response OSWER Directive No 9235 6-03 March 1991

21 "Risk Assessment Guidance for Superfund - Volume I Human Health Evaluation Manual (Part A)," December 1989, EPA/540/1-89/002

22 EPA 1991b "Risk Assessment Guidance for Superfund Volume I, Human Health Evaluation Manual (Part B), Development of Risk-Based Preliminary Remediating Goals " Office of Emergency and Remedial Response OSWER Directive No 9285 7-01B December 1991

23 EPA 1991c "Risk Assessment Guidance for Superfund Volume I, Human Health Evaluation Manual (Part C), Risk Evaluation of Remedial Alternatives " Office of Emergency and Remedial Response OSWER Directive No 9285 7-01C 1991

24 EPA 1992a "Guidance for Data Useability in Risk Assessment " Office of Emergency and Remedial Response OSWER Directive No 9285 7-09A April 1992 (and Memorandum from Henry L. Longest dated June 2, 1992)

25 "Risk Assessment Guidance for Superfund Volume I Human Health Evaluation Manual Supplemental Guidance Dermal Risk Assessment " Interim Guidance, 1998

26 "Risk Assessment Guidance for Superfund - Volume II Environmental Evaluation Manual," March 1989, EPA/540/1-89/001

27 EPA 1992b "Supplemental Guidance to RAGS Calculating the Concentration Term " Office of Emergency and Remedial Response OSWER Directive No 9285 7-081 May 1992

28 EPA 1993a "Data Quality Objectives Process for Superfund " Office of Solid Waste and Emergency Response EPA/540-R-93-071 September 1993

29 EPA 1998a "Risk Assessment Guidance for Superfund, Volume 1 - Human Health Evaluation Manual (Part D, Standardized Planning, Reporting, and Review of Superfund Risk Assessments) Interim Process for Designing and Conducting Ecological Risk Assessments " Office

of Solid Waste and Emergency Response EPA/540-R-97-033 January 1998

30 EPA 1998b "EPA Guidance for Quality Assurance Project Plans " Office of Research and Development EPA QA/G-5 EPA/600/R-98/018 February 1998

31 EPA 2001 "EPA Requirements for Quality Assurance Project Plans " Office of Environmental Information EPA QA/R-5 EPA/240/B-01/003 March 2001

32 "Health and Safety Requirements of Employees Employed in Field Activities," U S EPA, Office of Emergency Response, July 12, 1981, EPA Order No 1440 2

33 "Exposure Factors Handbook", EPA, 1997

34 Integrated Risk Information System (IRIS), 2000

35 "Health Effects Assessment Summary Tables (HEAST), "U S EPA, Office of Solid Waste and Emergency Response, 1997, EPA/540/R-95/036

36 "Guidance for Conducting Non-Time-Critical Removal Actions Under CERCLA", U S EPA, Office of Emergency and Remedial Response, August 1993, OSWER Directive No 9360 0-32

## Appendix B

